

SUBJECT: Machine Locator Arm
LA, LA-5 and LA-6 Models

DATE: December 10, 1937

TO ALL OFFICES:

This bulletin illustrates and describes the installation, function and adjustment of the Machine Locator Arm mechanism which has been adopted as standard equipment for the LA, LA-5 and LA-6 models to eliminate the possibility of machines stopping off center. This mechanism should only be installed in machines in the Field wherein stopping-off-center difficulty has been encountered, in which case the following material should be requisitioned:-

1	27-763	2	77
1	41-760	2	2761
1	41-714	1	2701 or 2701 $\frac{1}{2}$
2	47064	1	41-797
1	47500	1	785 $\frac{1}{4}$
1	47352	1	2846
2	70	1	56519
1	2770x1	2	2006
	1		2779

This change obsoletes the use of the following material, which is to be removed from such machines and returned to Orange for an off-setting credit, properly identified on Form 658-S, together with the serial number of machines affected.

40-797x1

40-714

A template is required as shown in Figure (3) Plate 5 for the drilling of the necessary holes in the left hand side frame. Holes (X) and (Y) have not been provided in left hand side frames of machines released prior to serial number 248050 however, holes (Z), (AA) and (BB) have been provided in some side frames but corresponding holes are furnished in the template so that in the event side frames do not contain them, they may be drilled. The drilling of a hole in the right hand side frame may be required for the 2770x1 guide stud for the 27-763 cut out lever. To drill this hole it is first necessary to scribe lines (DD) and (CC) on the side frame as per the dimensions given in Figure 4. Center punch the side frame at the location where lines (DD) and (CC) cross and drill the center punch mark with a #47 drill.

FUNCTIONING EXPLANATION

When the machine mechanism is neutralized, the clutch yoke stud (A) locates in the recess (Q) of the switch closing arm (M), the forward end of (M) positions downward, and the machine locator arm (D) positions in the path of offset (B). The pivoting movement of (M) causes adjustable slide (H) which is attached to (M) to also position downward and allow the lower start and stop switch contact blade (F) to break contact. See Fig. 1.

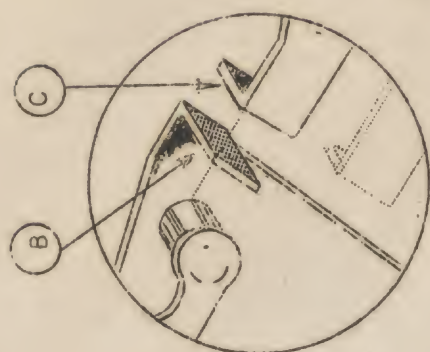
When the machine is operated, clutch yoke stud (A) positions at (R) or (S) see insert #1 Plate 3 and causes a pivoting movement of the switch closing arm (M); which raises the forward end of the switch arm. This causes the locator arm (D) to drop downward from the path of offset (B) as indicated by the dotted lines in Figure 1. This also causes adjustable slide (H) which is attached to (M) to move upward forcing the fibre roller (E) against the lower contact blade (F) and causing contact.

If the crank hole knob of the machine should be replaced by a crank handle (V) the length of the pivot stud (U) of the crank handle (V) would cause shaft (L) to move in the direction of arrow (W) and raise the forward end of switch arm (M). See Fig. 2. This causes the locator arm to position downward (as shown) out of the path of offset (B) and allows the machine to be operated by hand crank.

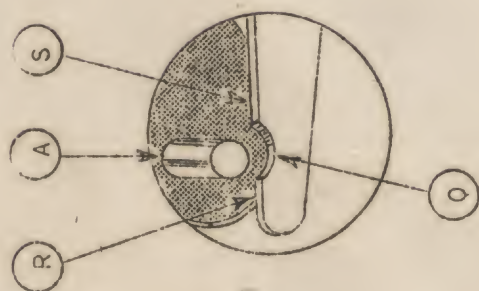
HOW TO ADJUST

- 1 Adjust the switch closing arm (M) to the clutch yoke stud (A) by means of eccentric bushing $284\frac{1}{16}$ (N). When the clutch yoke click (P) is located in the neutral notch of the clutch yoke, stud (A) on the clutch yoke should seat in the recess (Q) of the switch closing arm (M). Lock the adjustment of the switch closing arm in place by tightening its lock nut. See Fig. 1.
- 2 Before installing the start and stop switch in the machine, adjust the bottom switch blade downward so that the distance between the two contact points is about $5/16$ ". This is necessary since the tension of the lower blade of the switch is of value in restoring the switch closing arm recess to its neutral position against stud (A).
- 3 With the clutch yoke in neutral position, loosen screw (G) and adjust slide blank (H) upward or downward until the switch contact points are positioned approximately $1/32$ " apart. After obtaining this adjustment, tighten screw (G) securely.
- 4 With the mechanism located in neutral, locator arm (D) should be in a raised position with the top of lug (C) and the top of locator arm offset (B) aligned. See insert #2 Plate 3. When the machine is being operated either in addition or subtraction, the locator arm (D) should be located in its down position as shown by the dotted lines. To secure the proper adjustment of the locator arm, loosen screw (K) and move arm (J) upward or downward to suit and then tighten screw (K) securely.
- 5 The switch arm lifter shaft (L) Figure 2 is adjusted by means of lever (T) so that when the hand crank (V) is inserted, shaft (L) will move in the direction of arrow (W) and cause the locator arm (D) to drop downward as shown in Figure 2. To obtain this adjustment, loosen the set screw in the hub of lever (T) and move the lever either to the right or left on shaft (L) to suit, after which the set screw should be tightened securely.

The strength of spring (EE) which restores shaft (L) to its neutral position when the crank handle (V) is removed, can be adjusted by loosening set screw (GG) and moving collar (FF) to the right or left along shaft (L) to suit. After this has been done the set screw should be tightened securely. See insert No. 3 on Plate 4.



Insert #2



Insert #1

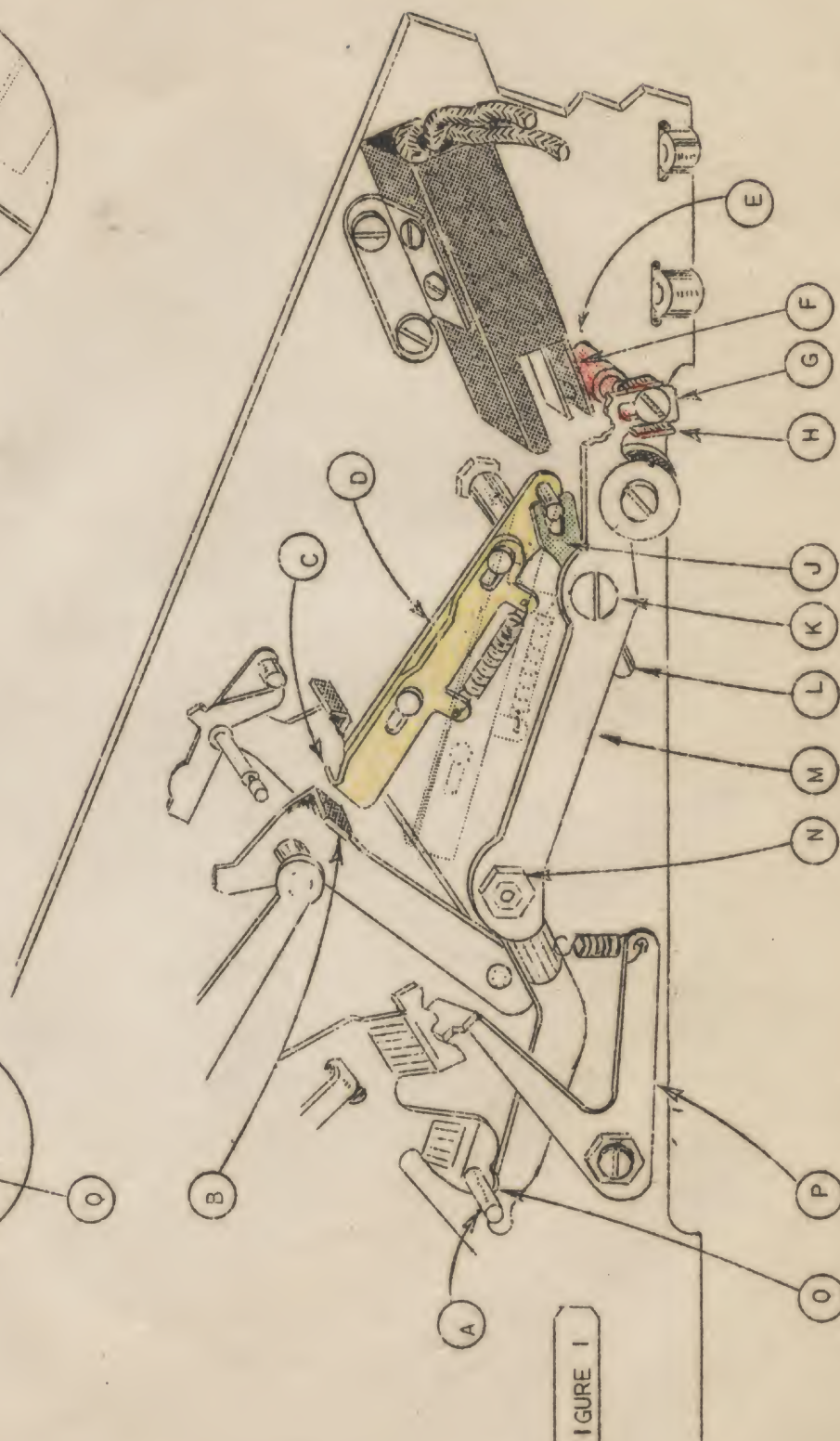


FIGURE 1

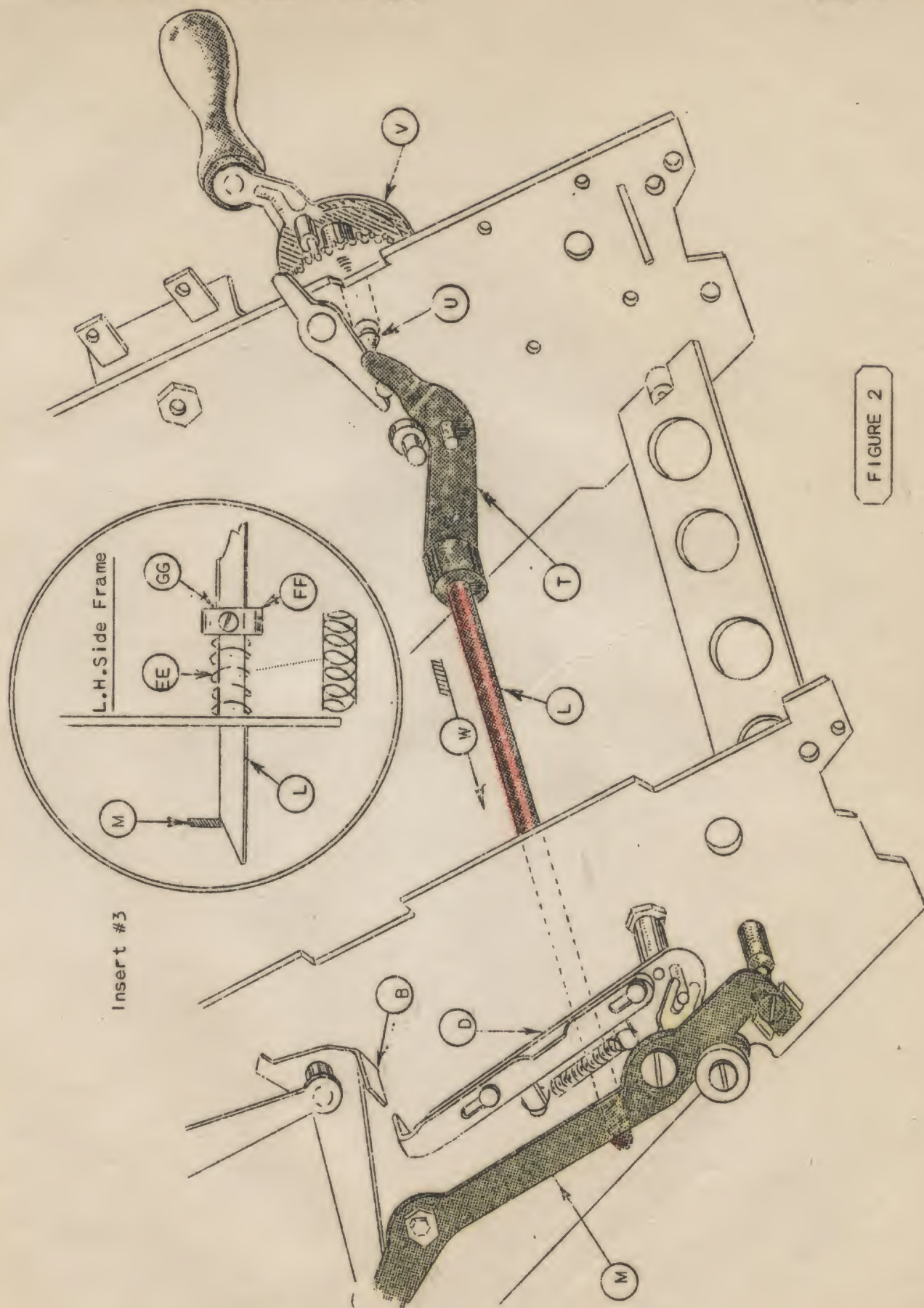
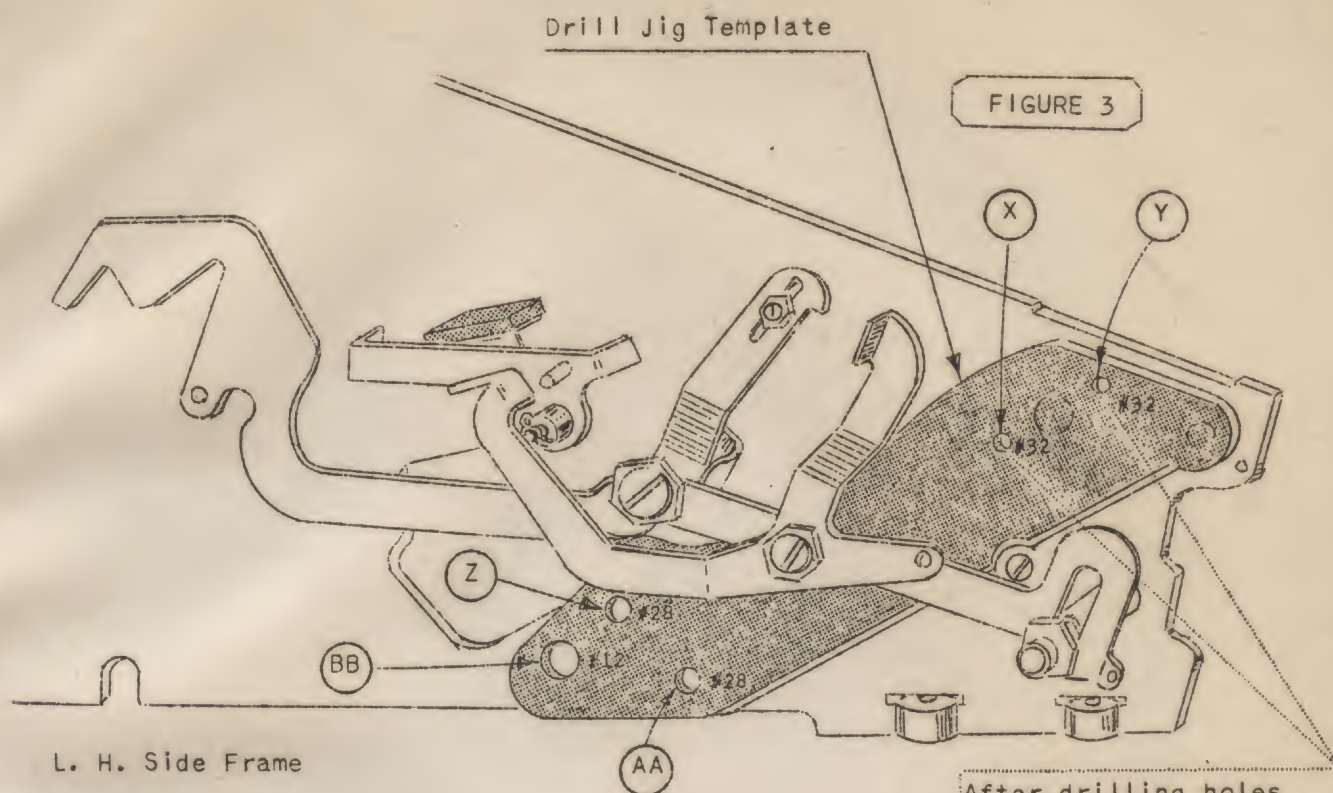


FIGURE 2

Insert #3



After drilling holes (X) and (Y) with a #32 drill tap with a 6-40 tap to accommodate the 2006 switch screws.

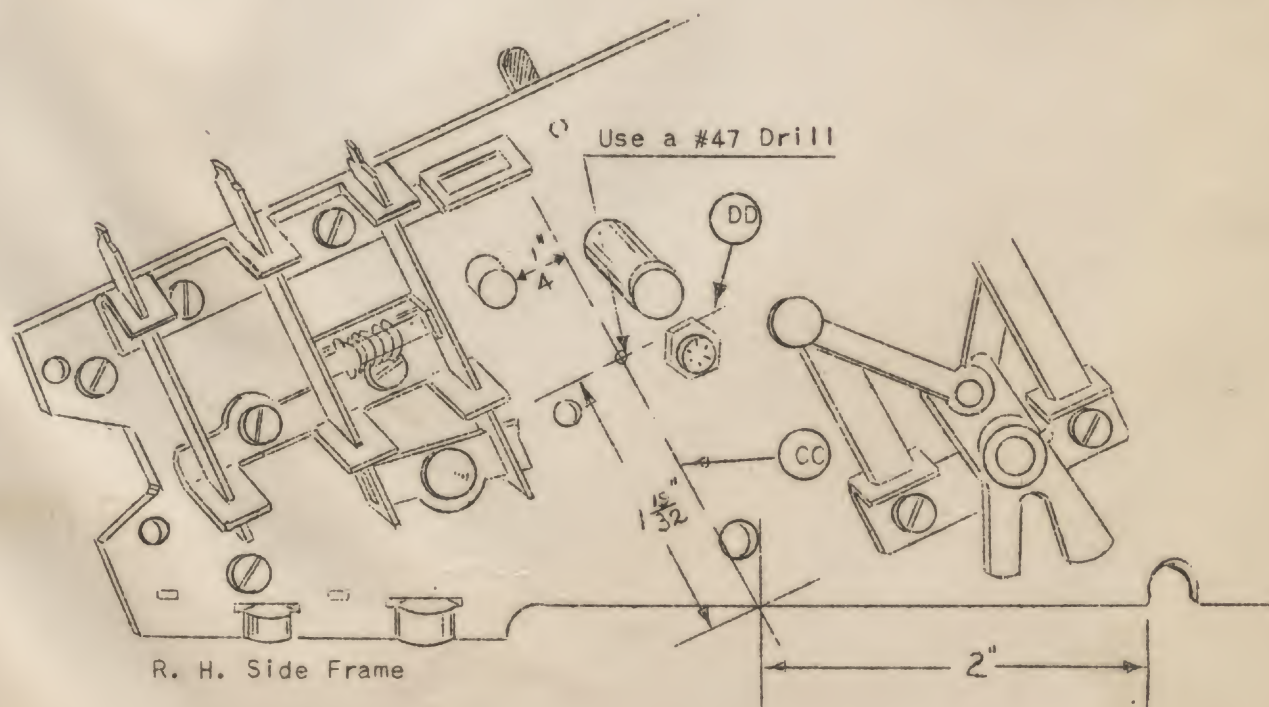
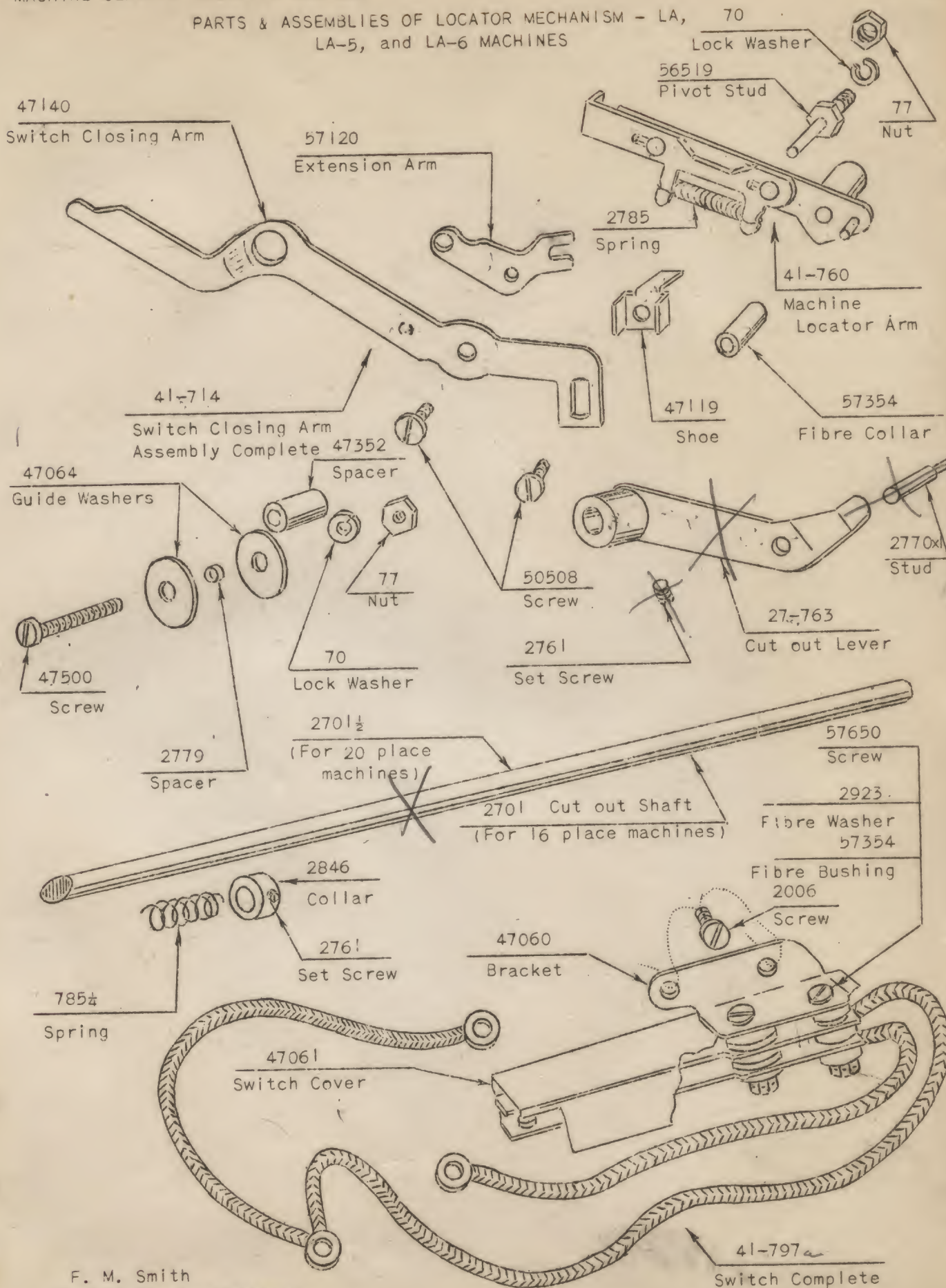


FIGURE 4

PARTS & ASSEMBLIES OF LOCATOR MECHANISM - LA,
LA-5, and LA-6 MACHINES

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